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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/815,979	04/02/2004	Peter-Franz Arnold	41653-200624	7720
26694	7590	05/09/2007		
VENABLE LLP P.O. BOX 34385 WASHINGTON, DC 20043-9998			EXAMINER HARMON, CHRISTOPHER R	
			ART UNIT	PAPER NUMBER
			3721	
			MAIL DATE	DELIVERY MODE
			05/09/2007	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

Application No.

10/815,979

Applicant(s)

ARNOLD ET AL.

Examiner

Christopher R. Harmon

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 26 February 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1,3-5,7-12,14-17,19 and 20 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☐ Claim(s) 1,3-5,7-12,14-17,19 and 20 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 2/26/07 has been entered.

### ***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1, 7, 11-12, 14-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Teed (US 3,857,657) in view of Pall (US 4,116,738) or Hotchkiss (US 4,973,503).

Teed discloses a method for producing a nonwoven comprising introducing fibers to separating devices 20 and 50 above conveyor 30 positioned parallel to the rotation axis of separating elements 22. Note: air tunnel 50 acts as a second separating device for separating fibers and distributing over the surface of conveyor 30. Note: the claims are read in a broad context, therefore the fibers, even though compressed into a pressed pulp sheet S, are considered of a finite length; claim 12 is construed to mean at

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least one separating device comprises the rotating element and is positioned as claimed not each of a plurality. Regarding claim 15, chutes are defined by the chamber wall and conduit end 52; see figures 1 and 3.

Teed does not directly disclose introducing fibers in a parallel direction of the longitudinal axis of the separating device, however Pall and Hotchkiss both disclose introducing fibers in this manner; see figures 1. It would have been obvious to one of ordinary skill in the art at the time of the invention to configure the introduction of fibers in the manner as taught by either Pall or Hotchkiss in the invention to Teed as desired. Note: it has been held that rearranging parts of an invention involves only routine skill in the art. *In re Japikse*, 86 USPQ 70.

4. Claims 1, 7, 11-12, 14-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Radwanski et al. (US 4,701,294) in view of Pall (US 4,116,738) or Hotchkiss (US 4,973,503).

Radwanski et al. disclose a method of producing a nonwoven comprising feeding fibers 16 to a longitudinal axis of separating device/rotatable drum 14 with rotating elements and separating device/gas delivering means 34 positioned above conveyor 32 which is positioned parallel to the rotational axis of separating device 14; see figure 1. Downstream chutes are formed from the housing 10 (upper and lower) as well as positionable devices 38 and 40 that converge into chamber 50 upstream conveyor 32.

Radwanski does not directly disclose introducing fibers in a parallel direction of the longitudinal axis of the separating device, however Pall and Hotchkiss both disclose

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introducing fibers in this manner; see figures 1. It would have been obvious to one of ordinary skill in the art at the time of the invention to configure the introduction of fibers in the manner as taught by either Pall or Hotchkiss in the invention to Radwanski as desired. Note: it has been held that rearranging parts of an invention involves only routine skill in the art. *In re Japikse*, 86 USPQ 70.

5. Claims 1, 3-5, 8-10, 17, and 19-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Arthur et al. (GB 2145918) in view of Teed (US 3,857,657) or Radwanski et al. (US 4,701,294) and Pall (US 4,116,738).

Arthur et al. disclose producing a nonwoven web comprising separating (multi and bi-component) fibers in separating device with rotating separation element 16, 80, 144, 146 and feeding material to conveyor 88 (also embodiment with two devices to conveyor 152 with different designs) see figures 6-7 and 9.

Regarding claim 10, Arthur et al. disclose adding granulate to the tow by unit 142; see figure 1. Regarding claim 15, each separating device has conveying chute downstream; see figure 9. Regarding claim 17, conveying chute (not labeled) is positioned above rotational elements 144 and 146.

Arthur et al. do not directly disclose the rotational axis of the separating device being parallel to the conveying direction, however both Teed and Radwanski et al. disclose a method of separating fibers with separating devices including separating elements with rotational axis in a parallel relationship with that of a conveying direction of a conveyor below, as discussed supra.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to position a separating device as taught by Teed or Radwanski as an alternate configuration for separating and accelerating the fibers. Note that Arthur also contemplates the use of other conveyors in various alternates; see page 1, lines 60-65.

Furthermore it would have been obvious to one of ordinary skill in the art to include introducing fibers in a parallel direction of the longitudinal axis of the separator device as taught by Pall in the modified invention to Arthur as desired. As noted supra, it has been held that rearranging parts of an invention involves only routine skill in the art. *In re Japikse*, 86 USPQ 70.

Regarding claim 16, Arthur discloses the conveying chute 134 converging with air chute 136 forming a chamber with top 132; see figure 5. It would have been obvious to one of ordinary skill in the art to combine the multiple embodiments of Arthur to include multiple separating elements (as depicted in figure 9) with chutes converging into a chamber as illustrated in figure 5.

### ***Response to Arguments***

6. Applicant's arguments are not persuasive. With regard to the configuration of the claimed device, merely rearranging parts of a known invention involves only routine skill in the art and does not amount to novelty of invention: "section 103 cannot easily be satisfied by inventions that rearrange old elements in new combinations with each element performing the same function it performed in the prior art, even though the new

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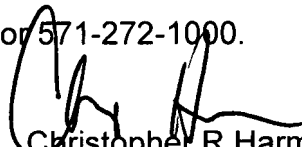
combination produces a more striking result than the old ones. *Sakraida v. Ag Pro, Inc.*, 425 U.S. 273 (1976).

**Conclusion**

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Christopher R. Harmon whose telephone number is (571) 272-4461. The examiner can normally be reached on Monday-Friday from 8-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rinaldi Rada can be reached on (571) 272-4467. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

  
Christopher R Harmon  
Primary Examiner  
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